CONTINUOUS MINERS - AUGER TYPE

A. Original Equipment Manufacturer (OEM)

The following OEM offers noise controls for new underground auger miners as standard equipment. Local dealers may be contacted for availability and further details.

Manufacturer	Treated	Treated Pan	Other Noise
	Cutting Heads	Line	Controls
Fairchild International	Х	X	

[&]quot;X" indicates product availability.

For older underground auger miners without noise controls, additional retrofit noise controls may be needed.

B. Retrofit Noise Controls

This section deals with older underground auger miners without noise controls. The effectiveness of the retrofit noise controls depends on the quality of both the acoustical materials and the installation.

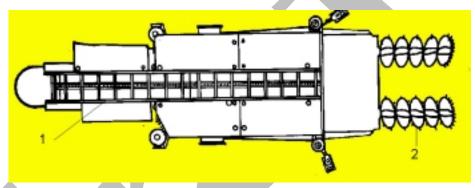


The following manufacturers may be contacted for information regarding retrofit noise control kits or options.

Manufacturer	Treated	Treated Pan	Other Noise
	Cutting Heads	Lines	Controls
	(Cost)	(Cost)	(Cost)
Fairchild International	X (\$20,000/pair)	X (\$12,000-\$15,000)	

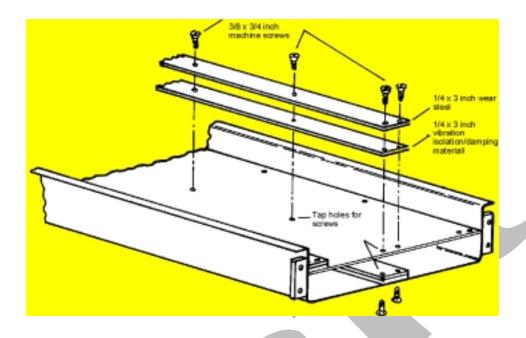
[&]quot;X" indicates product availability.

There is also the "do-it-yourself" approach (illustrated below) which can be done in a shop area or rebuild facility.



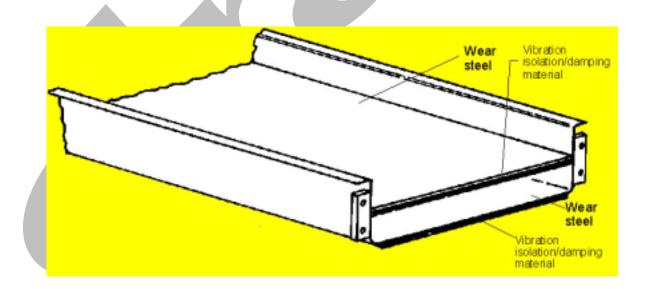
The following are major areas where retrofit noise controls should be considered:

1. <u>Conveyor Pan Lines</u> - Treat conveyor pan lines to reduce vibration and isolate the chain conveyor flights from the pan. This can be accomplished with individual wear strips or full coverage of the pan line (illustrated below.) The chain turn-around should provide smooth transition for the chain and flights.

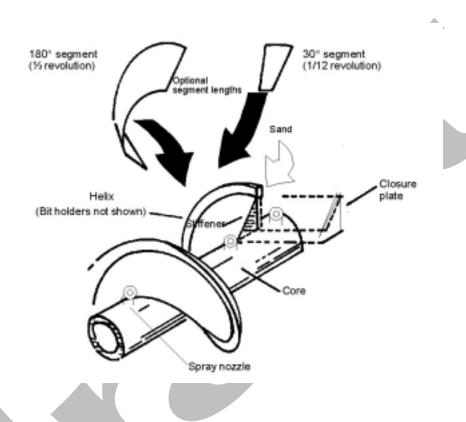


NOTE: Individual strips may be installed by welding or fastening them to the deck with machine screws.

Full coverage treatment to the upper and lower pan lines is shown as follows:



2. <u>Auger Cutting Heads</u> - Weld a steel stiffener to the one side of the cutting head helix. Fill the hollow space between the stiffener and helix with sand (See illustration.) Explicit details for the construction of these cutting heads can be found in the USBM Informational Circular (IC) 8971 under Appendix D.



NOTE: The construction of the sand-filled auger cutting head should only be done in a well supplied shop or rebuild facility.

C. Alternative Technology

Remote Controls - In certain situations, remote control may be used as a noise control by increasing the distance between the operator and the machine.